



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/539,343	03/31/2000	Dean P. Macri	10559/154001/P7988	1434

20985 7590 12/27/2005
FISH & RICHARDSON, PC
P.O. BOX 1022
MINNEAPOLIS, MN 55440-1022

EXAMINER

GOOD JOHNSON, MOTILEWA

ART UNIT PAPER NUMBER

2677

DATE MAILED: 12/27/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/539,343

Applicant(s)

MACRI ET AL.

Examiner

Motilewa Good-Johnson

Art Unit

2677

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 23 September 2005.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,8,10,11,17,19,20,26 and 31-46 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,8,10,11,17,19,20,26 and 31-46 is/are rejected.
- 7) ☒ Claim(s) 46 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 09/23/2005 has been entered.

Double Patenting

2. Applicant is advised that should claim 41 be found allowable, claim 46 will be objected to under 37 CFR 1.75 as being a substantial duplicate thereof. When two claims in an application are duplicates or else are so close in content that they both cover the same thing, despite a slight difference in wording, it is proper after allowing one claim to object to the other as being a substantial duplicate of the allowed claim. See MPEP § 706.03(k).

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the

Art Unit: 2677

applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1, 8, 10, 11, 17, 19, 20, 26 and 31-46 are rejected under 35 U.S.C. 102(e) as being anticipated by Yoshida et al., U.S. Patent Number 6,600,485 B1.

Regarding claim 1, Yoshida discloses a method of trimming a parametric surface, comprising: prior to rendering the parametric surface: producing a trimming texture, the trimming texture comprising a texture map image representation of a trimming curve for the parametric surface (figure 66, element 1), the trimming curve (figure 66, element 2) defining trimmed and untrimmed portions, the untrimmed portion comprising opaque pixels and the trimmed portion comprising transparent pixels (figure 69, col. 45, lines 54-64); and during rendering of the parametric surface: obtaining a list of polygons that define the parametric surface (figure 55); and drawing the polygons to generate the parametric surface, wherein drawing comprises applying the trimming texture to the polygons, the trimming texture being applied by texture mapping the trimming texture onto the polygons to produce the trimmed and untrimmed portions (col. 46, lines 9-51, figures 66 and 78-81)

Regarding claim 8, Yoshida discloses wherein the trimming texture is produced from a plurality of trimming curves for the parametric surface (col. 45, lines 42-45 and 54-67)

Regarding claim 10, Yoshida discloses further comprising: obtaining a material texture for the parametric surface; and applying the material texture to the untrimmed portion (col. 45, lines 54-56)

Regarding claim 32, Yoshida discloses wherein the trimming curve is produced from one or more vector-valued functions (col. 10, line 48)

Regarding claim 33, Yoshida discloses wherein the parametric surface is part of a three-dimensional model (col. 10, lines 45-46)

Regarding claim 34, Yoshida discloses wherein the method is performed by an alpha channel (col. 10, line 49) of texture blending/mapping hardware in a three-dimensional (3D) graphics processor (300, polygon drawing processor)

Regarding claim 35, Yoshida discloses wherein the parametric surface comprises control points that dictate a shape of the parametric surface, the trimming texture being applied to the shape of the parametric surface dictated by the control points (col. 8, lines 53-57)

Regarding claim 36, Yoshida discloses wherein the polygons have texture coordinates that are used in defining a texture of the polygons (col. 10, line 47)

Regarding claims 11, 17, 19 and 37-40, they are rejected based upon similar rational as above claims 1, 8, 10 and 32-36. Yoshida further discloses a program stored on recording medium for implementing the hardware, col. 11, lines 34-39.

Regarding claims 20, 26, 31 and 41-46, they are rejected based upon similar rational as above claims 1, 8, 10 and 32-36. Yoshida further discloses an apparatus for trimming a parametric surface including a memory and a processor that executes prior to rendering (100, host processor) and during rendering for drawing the polygons to generate the parametric surface (300, polygon drawing processor)

Response to Arguments

5. Applicant's arguments with respect to claims 1, 8, 10, 11, 17, 19, 20 and 26 have been considered but are moot in view of the new ground(s) of rejection.

6. Applicant's arguments, see Remarks, filed 08/05/2005, with respect to the rejection(s) of claim(s) 1, 8, 10, 11, 17, 19, 20, 26 and 31-46 under 103 have been fully considered and are persuasive. Therefore, the rejection has been withdrawn.

However, upon further consideration, a new ground(s) of rejection is made in view of Yoshida, U.S. Patent Number 6,600,485 B1.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Motilewa Good-Johnson whose telephone number is (571) 272-7658. The examiner can normally be reached on Monday, Tuesday and Wednesday 9:00 AM - 6:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Amr Awad can be reached on (571) 272-7764. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Motilewa Good-Johnson
Examiner
Art Unit 2677

mgj

AMR A. AWAD
PRIMARY EXAMINER
Amr A. Awad